

What Is Claimed Is:

1. A method for balancing a mail run comprised of a plurality of mail pieces assembled on an automated high speed mail production apparatus, the method comprising:

dividing the mail run into defined subsets;

accounting for a disposition of mail pieces processed in the mail production apparatus;

identifying gaps in the subsets wherein the disposition of one or more mail pieces is unaccounted for;

stopping the mail production apparatus if a predetermined number of subsets include identified gaps.

2. The method of claim 1 further comprising the steps of:

determining that a completed subset does not include identified gaps; and

submitting the completed subset for delivery prior to finishing balancing for all subsets in the mail run.

3. The method of claim 2 further comprising the steps of:

providing a real-time indication of identified gaps during assembly of the mail run by the mail production apparatus; and

resolving the disposition of identified gaps during assembly of the mail run by the mail production apparatus; and

updating the accounting of mail piece dispositions based on the resolved gaps.

4. The method of claim 2 further comprising the steps of:

determining whether a downstream subset, processed prior to the completed subset, has one or more unresolved gaps; and

if the downstream subset has one or more unresolved gaps, then delaying the step of submitting the completed subset for delivery until the downstream subset's gaps are resolved

5. The method of claim 1 further including the steps of:

providing a real-time indication of identified gaps during assembly of the mail run by the mail production apparatus; and

resolving the disposition of identified gaps during assembly of the mail run by the mail production apparatus; and

updating the accounting of mail piece dispositions based on the resolved gaps.

6. The method of claim 1 further including the steps of:

assigning a sequence of identification numbers to the mail pieces in the mail run; and wherein the step of identifying gaps in the subsets includes identifying one or more identification numbers of the sequence that are missing.

7. The method of claim 1 wherein the step of accounting for the disposition of mail pieces includes accounting for items manually repaired by an operator and items that are misprocessed or damaged and require reprocessing.

8 A method for balancing a mail run comprised of a plurality of mail pieces assembled on an automated high speed mail production apparatus, the method comprising:

dividing the mail run into defined subsets;

accounting for a disposition of mail pieces processed in the mail production apparatus;

identifying gaps in the subsets where the disposition of one or more mail pieces is unaccounted for;

determining that a completed subset does not include identified gaps; and

submitting the completed subset for delivery prior to finishing balancing for all subsets in the mail run.

9. The method of claim 8 further including the steps of:

determining whether a downstream subset, processed prior to the completed subset, has one or more unresolved gaps; and

if the downstream subset has one or more unresolved gaps, then delaying the step of submitting the completed subset for delivery until the downstream subset's gaps are resolved.

10. The method of claim 8 further including the steps of:

assigning a sequence of identification numbers to the mail pieces in the mail run; and wherein the step of identifying gaps in the subsets includes identifying one or more identification numbers of the sequence that are missing.

11. The method of claim 8 wherein the step of accounting for the disposition of mail pieces includes accounting for items manually repaired by an operator and items that are misprocessed or damaged and require reprocessing.

12. A method for balancing a mail run comprised of a plurality of mail pieces assembled on an automated high speed mail production apparatus, the method comprising:

dividing the mail run into defined subsets;

accounting for a disposition of mail pieces processed in the mail production apparatus;

identifying gaps in the subsets where the disposition of one or more mail pieces is unaccounted for;

providing a real-time indication of identified gaps during assembly of the mail run by the mail production apparatus; and

resolving the disposition of identified gaps during assembly of the mail run by the mail production apparatus; and

updating the accounting of mail piece dispositions based on the resolved gaps.

13. The method of claim 12 further comprising the steps of:

determining that a completed subset does not include identified gaps; and

submitting the completed subset for delivery prior to finishing balancing for all subsets in the mail run.

14. The method of claim 13 further including the steps of:

determining whether a downstream subset, processed prior to the completed subset, has one or more unresolved gaps; and

if the downstream subset has one or more unresolved gaps, then delaying the step of submitting the completed subset for delivery until the downstream subset's gaps are resolved.

15. The method of claim 12 further including the steps of:

assigning a sequence of identification numbers to the mail pieces in the mail run; and wherein the step of identifying gaps in the subsets includes identifying one or more identification numbers of the sequence that are missing